

# Naval Information Warfare Center Atlantic

Leading the Department of the Navy in the acquisition, development and rapid delivery of Command, Control, Communications, Computer, Intelligence, Surveillance and Reconnaissance (C4ISR) information warfare solutions, advanced cyber capabilities and business systems for the Warfighter.

## Delivering mission-critical information warfare capabilities to the Warfighter

Naval Information Warfare Center (NIWC) Atlantic is a Navy engineering and Information Technology (IT) command and part of the Naval Research and Development Establishment (NR&DE).

Our work is shaped by requirements that demand research and engineering with the goal of delivering the operational advantage gained from fully integrating naval information functions, capabilities and resources to optimize decision making and maximize warfighting effects.

MISSION: Serve our nation by delivering information warfare solutions that protect national security.

VISION: WIN THE INFORMATION WAR.

## Unique Facilities

- Surface Ship Test and Integration
- Common Submarine Radio Room production and testing
- National Cyber Range Complex
- Poseidon Park EMI and Environmental test labs
- National Security Ops Center
- 5G Comms and Outdoor Optical Range
- Cyber Forensics and Cyber Computer Network Defense Labs
- DOD Component ENT Data Centers and SAT Comms Gateways
- Small Autonomous Unmanned Systems Range
- Seaworthy AI Lab
- Vehicle C4I systems integration, testing and production facility
- Global Distance Support Desk
- SW Defined Radio & RF Testing
- Air Traffic Control Facility

## Unique Capabilities

- Navy Afloat Networks CANES, ADNS, ISNS, CENTRIXS and CES
- IA and Navy Cybersecurity protection of DOD IT & telecom systems
- Navy Afloat Transport & Nav. interoperable communications
- Battlespace Awareness ISR/IO CB-ISEA services
- C2 and Afloat Applications targeting support, chemical-biological warnings and logistics
- Design, engr. and integrate C4ISR capabilities into tactical military vehicle platforms
- Equip Marines with mobile C3 facilities, devices and services and USMC Installations Command Electronic Security Systems
- NAVWAR Red Team (NSA, USCYBERCOM and DOD Cyber Red Team Accredited)
- IT solutions for satellites, command & op centers, Naval air traffic control, military fuel systems, force protection and military health IT systems.

## Global Warfighter Support



## Organization Chronology

### Meeting the needs of the warfighter

- 1993 BRAC: Naval Electronic Systems Engineering Center (NAVELEX) Charleston consolidated with others to form Naval Command, Control and Ocean Surveillance Center In-Service Engineering East Coast Division (NISE East)
- 2000: SSC Charleston formed by consolidation of Naval Computer and Telecommunications Command (NCTC) and NISE East
- 2005: 1st remote Antarctic Meteorology Operations support from Charleston
- 2005: 1st Up Armored HMMWVs integrations with C4I and CIED. 2,000 delivered FY06
- 2005 - 2008 BRAC: SSCs (Charleston, Norfolk and New Orleans) realignment
- 2006: 1st CSRR install, SSGN 726
- 2006: 1st Internet Café facilities fielded in Iraq and Afghanistan
- 2007: 1st remote Air Traffic Control support for Antarctic operations
- 2007: Launched the Mine Resistant, Ambushed Protected (MRAP) Vehicle C4I Integration Program. Reached full-scale production in less than a year.
- 2007: Navy Networks Engineering Laboratory (CHS Bldg 3146) completed
- Sep 2008: SSC Atlantic commissioned**
- 2008-2010: Continue rapidly deploying full service systems engineering capabilities in high-risk areas: Transportable ATCs, HF Radio Network, AV upgrades, Mobile Ashore Terminals, JOC in Stuttgart, Internet cafés, BFT and D-DACT installs
- 2011: Designated DOD Science and Technology Reinvention Laboratories (STRL)
- 2011: Computer Network Defense Service Provider (CNDSP) accreditation by USSTATCOM
- 2011: Opening of the Charleston Data Center
- 2012: Conclusion of MRAP program. More than 27,000 MRAP and MATVs integrated with C4I
- 2013: 1st Navy's Consolidated Afloat Networks and Enterprise Services (CANES) Install, DDG 85
- 2014: Red Team Accreditation by USSTRATCOM
- 2015: 1st DON Cyber Forensics Criminal Investigations Laboratory to earn American Society of Crime Laboratory Directors/Laboratory Accreditation Board's international accreditation
- 2016: Cybersecurity Service Provider (CSSP) accreditation by USSTRATCOM
- 2016: Deployed the Multi-Reconfigurable Training System (MRTS), a virtual training system
- 2017: Designated as DOD Component Enterprise Data Center (CEDC)
- 2017: Opening of Cyber Forensics and Data Recovery Laboratories
- 2017: Opening of the Cyber Education and Certification Readiness Facility (CERF) Lab
- 2018: First CANES Refresh (LSD 50)
- 2018: Stood-up Information Warfare Research Project
- 2019: SSC Atlantic name change to NIWC Atlantic
- 2020: Stood-up NavalX Tech Bridges
- 2020: IWRP \$400M ceiling increase

## Workforce profile

- 5,090 (4,971 Gov't, 119 Mil) and ~9,000 from Industry
- 281 New Professionals
- 124 Student Interns
- 13 Senior Scientific Technical Managers (SSTMs)
- Education
  - 1.2% PhDs
  - 27% Masters
  - 44% Bachelors
- Top Occupational Series
  - IT Specialist
  - Electronics Engineer
  - Computer Scientist
  - Electronics Tech
  - Mgmt & Prog Analyst
- 10 yrs. avg. service
- 45 yrs. avg. age
- 42% prior military

## Business Profile

- Primarily a Navy Working Capital Fund (NWCF) Organization. Relying on sales revenue rather than direct Congressional appropriations to finance its operations
- FY20
  - \$3.76B Total Obligation Authority
  - \$1.85B Total Small Business eligible dollars
  - 47.7% Total Small Business
  - 400+ Small Businesses
  - 97% Competition

## Locations

- Charleston, SC (NIWC Atlantic HQ)
- Hampton Rds, VA
- New Orleans, LA
- National Capital Region
- Tampa, FL
- Fayetteville, NC
- Pax River, MD
- Kings Bay, GA
- Mayport, FL
- Groton, CT
- Stuttgart, Germany
- Naples, Italy
- Bahrain

## Departments

### Fleet C4I and Readiness

Ensuring information warfare superiority through collaboration, alignment and engineering excellence.

- Battlespace Awareness Division
- Information Assurance and Navy Cybersecurity Division
- Navy Afloat Networks & C2 Applications Division
- Navy Afloat Transport and Navigation Division
- Foreign Military Sales / Air Integration / Coast Guard Division
- Surface Ship Integration Division
- Submarine Integration Division
- Shore C4I Integration Division
- Fleet Installations and Response Division

### Expeditionary Warfare

Rapidly delivering C4ISR, cyber and IT systems and engineering services to meet the information warfare needs of the Marine Corps and Special Operations Command.

- Expeditionary Intelligence Solutions Division
- Expeditionary Enterprise Systems and Services Division
- Land Systems Integration Division
- Expeditionary Command, Control and Communications (C3) Solutions Div.

### Enterprise Systems

Rapidly identify and implement affordable Enterprise IT solutions by promoting innovation, developing our personnel and forming strategic partnerships across NIWC Atlantic and with our customers.

- Data Center and Cloud Hosting Services Division
- Manpower, Personnel, Training and Education Systems Division
- Enterprise Business Systems Division
- Infrastructure Systems Division
- Afloat Apps Division

### Shore C2ISR and Integration

Engineering and fielding systems supporting operational forces overseas and readiness missions stateside.

- Defense Health Information Technology Division
- Special Reconnaissance, Surveillance and Exploitation Division
- Force Protection Solutions Division
- Command and Operations Centers Division
- Industrial Controls Systems and Applications Division
- Air Traffic Control Engineering Division

### Science and Technology

Researching, prototyping and managing advanced technology development ensuring technical superiority.

- Defense Advanced Research Projects Agency (DARPA)
- Office of Naval Research (ONR)
- Naval Innovative Science and Technology Program (NISE)
- Advanced Technology Research (ATR)

NIWC Atlantic's Technology Strategy utilizes overarching DOD, naval and NAVWARSYSCOM strategic plans, investment budgets, and formal naval needs and gaps statements.

## Technology Focus Areas (TFAs)

Developing today for the warfighter needs of tomorrow and beyond.



### Artificial Intelligence

- Provide warfighters with analytic-driven, data-informed, and technology-empowered capabilities to drive decision advantages and optimal mission outcomes.



### Assured Communications

- Addresses the demand for resilient, and sometimes covert, wired and wireless communications in degraded and/or denied environments.



### Cloud Computing

- IT modernization and digital transformation for resilient infrastructure, platform and software services.



### Cybersecurity

- Provides protection from unauthorized use of and/or defends electronic data, hardware, software from disruption or of the services they provide.



### DevSecOps

- Refers to replacing siloed Development, Security and Operations to create multidisciplinary teams that collaborate with shared and efficient practices and tools.



### Mobility

- Provide Wireless Technology and enterprise access for the warfighter to engage with a mobile environment and applications, anytime, anyplace.



### Model-Based Systems Engineering

- Technologies used to support the development, management and application of virtual constructs of varying fidelity across the spectrum of systems engineering.



### On-Demand Manufacturing processes

- Produce products and/or components, when or as they are required at the point of use, using additive and/or traditional manufacturing methods.

**Technology Strategy and TFA analysis drives work acceptance and lab/facility infrastructure allocations and tools.**

